International Journal of Agricultural Science and Research (IJASR)
ISSN(P): 2250-0057; ISSN(E): 2321-0087
Vol. 5, Issue 5, Oct 2015, 45-52

SPICES - A POTENT REPOSITORY OF ANTIOXIDANTS FOR PROCESSED FOODS – A REVIEW

SONIA. N. S, MINI .C & GEETHALEKSHMI. P. R

Department of Processing Technology, College of Agriculture, Vellayani, Kerala Agricultural University, Thrissur, Kerala, India

ABSTRACT

Free radicals are often produced in our body as well as food products as result of oxidation reactions. Antioxidants which could terminate these chain reactions by removing free radical intermediates and inhibit other oxidation reactions by being oxidized it selves are added to foods especially fatty foods for delaying rancidity and improving their shelf life. Antioxidants are able to prevent or inhibit oxidation processes. The protection of foods from oxygen is the basic principle upon which antioxidant protective technologies are based. Both synthetic as well as natural antioxidants are using in food industry but the application of synthetics has been reassessed due to its potential carcinogenic effects. Research is being focused on spices and its extracts which are a rich source of antioxidant compounds. Various antioxidant compounds have been isolated, many of them being phenols. Direct relationship exists between the total phenolic contents and the antioxidant activities in spices. Different antioxidant sources, their mode of action, application in food industry and antioxidant activities of garlic, black pepper, curry leaf and coriander leaves are reviewed in this paper.

KEYWORDS: Oxidation, Free Radicals, Bioactive Compounds, Phenols